

## EAST Search History

| Ref # | Hits    | Search Query   | DBs                          | Default Operator | Plurals | Time Stamp       |
|-------|---------|--|------------------------------|------------------|---------|------------------|
| L1    | 44      | ((("5764430") or ("4027217") or ("5745457") or ("6026066") or ("6295261") or ("5182741") or ("6452883") or ("6317399") or ("4967286") or ("5398231") or ("5498509") or ("5608717") or ("5608718") or ("5627895") or ("5675570") or ("5688173") or ("5729533") or ("5748607") or ("5751671") or ("5781221") or ("5766495") or ("5846131") or ("5875156") or ("5915858") or ("5949752") or ("5958651") or ("5967676") or ("5997976") or ("6019151") or ("6034930") or ("6102800") or ("6104677") or ("6124011") or ("6160789") or ("6202550") or ("6264295") or ("6270176") or ("6384929") or ("6386667") or ("6403191") or ("6440248") or ("6469969") or ("6074031") or ("20020191517"))).PN. | US-PGPUB;<br>USPAT;<br>USOCR | OR               | OFF     | 2007/12/03 11:42 |
| L2    | 44      | ((("5764430") or ("4027217") or ("5745457") or ("6026066") or ("6295261") or ("5182741") or ("6452883") or ("6317399") or ("4967286") or ("5398231") or ("5498509") or ("5608717") or ("5608718") or ("5627895") or ("5675570") or ("5688173") or ("5729533") or ("5748607") or ("5751671") or ("5781221") or ("5766495") or ("5846131") or ("5875156") or ("5915858") or ("5949752") or ("5958651") or ("5967676") or ("5997976") or ("6019151") or ("6034930") or ("6102800") or ("6104677") or ("6124011") or ("6160789") or ("6202550") or ("6264295") or ("6270176") or ("6384929") or ("6386667") or ("6403191") or ("6440248") or ("6469969") or ("6074031") or ("20020191517"))).PN. | US-PGPUB;<br>USPAT;<br>USOCR | OR               | OFF     | 2007/12/03 11:42 |
| L3    | 21      | L2 and (rotat\$5 revol\$6) near6 (speed velocity)  | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |
| L4    | 365     | sawtooth near6 reflect\$6  | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |
| L5    | 5       | (sawtooth (saw adj tooth)) near6 (nonreflect\$6 antireflect\$6 non-reflect\$6 anti-reflect\$6 (anti non) adj reflect\$6)   | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |
| L6    | 4739919 | reference feature mark indicator   | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |
| L7    | 3269991 | detect\$4 discriminat\$4 determin\$4   | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |
| L8    | 2844107 | ang\$4 rotat\$4 orientat\$4  | US-PGPUB;<br>USPAT           | OR               | ON      | 2007/12/03 11:42 |

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|     |        |  |                              |    |     |                  |
|-----|--------|--|------------------------------|----|-----|------------------|
| L9  | 157267 | L6 same L7 same L8   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L10 | 535737 | (optical compact digital) adj2 (disc disk<br>storage medium) cd dvd                        | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L11 | 25974  | L9 and L10   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L12 | 15021  | L7 near6 (L6 near4 L8)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L13 | 2519   | L12 and L10  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L14 | 203    | L12 same L10   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L15 | 409761 | (rotat\$4 revol\$7) near6 (speed velocity<br>tim\$3)                                       | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L16 | 55     | L14 same L15   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L17 | 108    | L12 same L15 and "369".clas.   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L18 | 2172   | mold\$4 near3 (pit cone)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L19 | 56430  | (nonreflect\$6 antireflect\$6 non-reflect\$6<br>anti-reflect\$6 (anti non) adj reflect\$6) | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L20 | 0      | L18 near6 L19  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L21 | 3      | L18 same L19   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L22 | 100    | L18 near6 reflect\$6   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L23 | 234    | (pit cone) near6 L19   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L24 | 1      | ("6109324").PN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L25 | 22260  | mirror\$3 near4 (area region)  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L26 | 358149 | (rotat\$5 revol\$6) near6 (speed velocity)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L27 | 154    | L25 same L26   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L28 | 535737 | (optical compact digital) adj2 (disc disk<br>storage medium) cd dvd                        | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L29 | 35     | L27 and L28  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L30 | 20     | L27 same (disc disk wheel)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |

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|     |        |  |                              |    |     |                  |
|-----|--------|--|------------------------------|----|-----|------------------|
| L31 | 315694 | (ang\$4 rotat\$4 orientat\$4) near6<br>(reference feature mark indicat\$2)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L32 | 182    | L25 same L31   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L33 | 19     | L32 and ("347" "360" "369").clas.  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L34 | 32     | (L32 and L28) not L33  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L35 | 203526 | (ang\$4 rotat\$4 orient\$6) near6 (mark<br>reference feature indicator pit)  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L36 | 44     | ((("5764430") or ("4027217") or<br>("5745457") or ("6026066") or ("6295261")<br>or ("5182741") or ("6452883") or<br>("6317399") or ("4967286") or ("5398231")<br>or ("5498509") or ("5608717") or<br>("5608718") or ("5627895") or ("5675570")<br>or ("5688173") or ("5729533") or<br>("5748607") or ("5751671") or ("5781221")<br>or ("5766495") or ("5846131") or<br>("5875156") or ("5915858") or ("5949752")<br>or ("5958651") or ("5967676") or<br>("5997976") or ("6019151") or ("6034930")<br>or ("6102800") or ("6104677") or<br>("6124011") or ("6160789") or ("6202550")<br>or ("6264295") or ("6270176") or<br>("6384929") or ("6386667") or ("6403191")<br>or ("6440248") or ("6469969") or<br>("6074031") or ("20020191517")).PN. | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L37 | 16     | L35 AND L36  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L38 | 47     | ("4202631"   "4270863"   "4393386"  <br>"4579455"   "4691231"   "5181081"  <br>"5317337"   "5518325"   "5542768"  <br>"5724197"   "5781221"   "5797688"  <br>"5846632"   "5854175").PN. OR<br>("5967676").URPN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON  | 2007/12/03 11:42 |
| L39 | 26     | ("3701130"   "4000510"   "4016603"  <br>"4087842"   "4094013"   "4106058"  <br>"4142209"   "4504873"   "4535439"  <br>"4556966").PN. OR ("4884259").URPN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON  | 2007/12/03 11:42 |
| L40 | 1      | ("6109324").PN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L41 | 1      | 10/661722.app.   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L42 | 30     | aihara-kenichi\$.in.   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L43 | 4      | L42 and label  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |

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|     |         |  |                              |    |     |                  |
|-----|---------|--|------------------------------|----|-----|------------------|
| L44 | 3       | ((("3426337") or ("20030117932")).PN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L45 | 2464386 | rotation\$3 speed velocity   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L46 | 146748  | L45 near4 (disc disk medium)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L47 | 4786479 | reference mark feature indicator index<br>indices                                  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L48 | 319751  | (multipl\$6 many plural\$4) near4 L47  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L49 | 178     | L46 near10 L48   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L50 | 57      | L49 and "369".clas.  | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L51 | 13467   | (detect\$4 measur\$5 determin\$4) near6<br>L46                                     | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L52 | 127909  | (rotation\$3 speed velocity) near3 (disc disk<br>medium)                           | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L53 | 219973  | (multipl\$5 plural\$4 identical) near3 (mark<br>reference indicator index indices) | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L54 | 103     | L52 near10 L53   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L56 | 7055    | sector near3 (mark reference indicator<br>index indices)                           | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON  | 2007/12/03 11:42 |
| L57 | 287     | (L56).ab.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON  | 2007/12/03 11:42 |
| L58 | 94      | L57 and "369".clas.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON  | 2007/12/03 11:42 |
| L59 | 27855   | (disc disk) near4 (speed velocity)   | USPAT                        | OR | OFF | 2007/12/03 11:42 |
| L60 | 2741    | (detect\$4 measur\$4 discriminat\$4<br>determin\$4) near6 L59                      | USPAT                        | OR | OFF | 2007/12/03 11:42 |
| L61 | 379     | L60 near10 (encoder opu pickup pick adj<br>up light laser)                         | USPAT                        | OR | OFF | 2007/12/03 11:42 |
| L62 | 101805  | "angular position"   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L63 | 3771    | L62 near3 ("same" identical)   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L64 | 213     | L61 and "369".clas.  | USPAT                        | OR | OFF | 2007/12/03 11:42 |
| L65 | 2847    | (250/231.1?).ccls.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |

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|     |        |   |                              |    |     |                  |
|-----|--------|---|------------------------------|----|-----|------------------|
| L66 | 88     | L63 and "369".clas.   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L67 | 56     | L61 and "360".clas.   | USPAT                        | OR | OFF | 2007/12/03 11:42 |
| L68 | 140    | (L61 not L64) not L67   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L69 | 2030   | (angl\$4 angular rotation\$4 near3 position)<br>near6 (mark label feature reference<br>indicator) near10 (disc disk)              | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L70 | 100    | L69 near10 (label image print\$4)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L71 | 2      | L61 near10 (equal identical)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L72 | 55     | encoder near6 ((disk disc) near3 (speed<br>velocity)) and "369".clas.   | US-PGPUB;<br>USPAT           | OR | ON  | 2007/12/03 11:42 |
| L73 | 4      | ("4319134"   "4680466"   "5073710"  <br>"5091643").PN. OR ("6750445").URPN.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L74 | 5      | ("4021714"   "4374351"   "4782404"  <br>"4849680"   "4965502").PN. OR<br>("5051677").URPN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L75 | 0      | L61 near10 (equal identical) near5 (width<br>spac\$4 length distance)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L76 | 15     | L65 and "369".clas.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L77 | 12     | ("4803354"   "4908510"   "5091643"  <br>"5239177"   "5369271"   "5406077"  <br>"5448060"   "5451776").PN. OR<br>("5640377").URPN. | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L78 | 2      | ("3426337").PN.   | USPAT;<br>USOCR              | OR | OFF | 2007/12/03 11:42 |
| L79 | 2847   | (250/231.1?).ccls.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L80 | 26678  | (angular angl\$4) near4 (feature mark slit<br>indicator)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L81 | 155    | L79 and L80   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L82 | 307478 | (angular angl\$4) near4 (position indicator<br>mark feature)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |

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|     |      |  |                              |    |     |                  |
|-----|------|--|------------------------------|----|-----|------------------|
| L83 | 5366 | L82 near4 (ring circumference circle circular)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L84 | 35   | L79 and L82 near4 (ring circumference circle circular)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L85 | 668  | L80 near10 (ring circumference circle circular)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L86 | 4    | L85 and L79  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L87 | 21   | ("3701846"   "3707600"   "4000510"   "4079942"   "4094013"   "4142209"   "4338683"   "4363116"   "4365324"   "4445144").PN. OR ("4556966").URPN.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L88 | 24   | ("2782626"   "3349325"   "4649267"   "4697077"   "4718879"   "4945231"   "4988865"   "5086641"   "5130536"   "5212380"   "5418362"   "5594241"   "5665974"   "5852413"   "5939712"   "5969344").PN. OR ("6145368"   "6184518").URPN. | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L89 | 34   | L83 and "369".clas.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L90 | 10   | ((multipl\$4 plural\$4) near4 (index sector) near3 (mark indicator)) near10 (ring circumference circle circular)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L91 | 21   | ("4793067"   "5129725"   "5171982").PN. OR ("6093928").URPN.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |
| L92 | 2    | ("3426337").PN.  | US-PGPUB;<br>USPAT;<br>USOCR | OR | OFF | 2007/12/03 11:42 |